

THE FARMER & GARDENER.

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AMERICAN FARMER.
This publication is the successor of the late **AMERICAN FARMER**, and is published at the office, at the N. E. corner of Market and Charles streets, at FIVE DOLLARS per annum, payable in advance. All subscribers who pay in advance, will be entitled to 50 cents worth of any kinds of seeds, which will be delivered, or sent, to their order.

American Farmer Establishment.

BALTIMORE: TUESDAY, JAN 31, 1837.

CANADA CORN.

We consider it proper at this time to call the attention of the Farmers in general—and particularly those who have suffered a loss of their crops from the unfavorableness of the past season,—to the yellow early Canada Corn, which has been cultivated here with such success, as to leave little room for doubt as to its superiority in overcoming the difficulties to be encountered in our ever varying climate. Five acres of this corn was raised the past season by our friend Mr. Hatch, of the Poughkeepsie Hotel, on his farm two miles below the village. It was planted about the 1st of June last, and after receiving no more than ordinary attention, has yielded sixty bushels to the acre, all perfectly sound and in as fine condition as any that we have ever seen.—We understand that it was perfectly ripe by the 10th of September, and will generally come to maturity in about ninety days. The land on which it was raised was in good condition, but not better than that of well cultivated farms in general. Mr. Hatch has already been applied to by fifty-four of our first farmers, for 147 bushels of this corn for seed next year.—*Poughkeepsie Eagle.*

This corn, which is sometimes called the *Dutton*, from the name of the gentleman who first introduced its culture into these states, deserves all the commendation contained in the above paragraph. It is highly prized in the state of New-York, as well as in several of the New England states, and we doubt not, when better known, will become a favorite in the more southern parts of our confederacy. The stalks are small and do not grow to near the height of many of the other varieties of corn; the ears, however, are longer than many of them, some of them attaining the length of 12 inches and more; the cob is of medium size, remarkably well filled up to its extreme point, with a beautiful yellow, approaching to orange, colored grains, there being 12 rows on an ear, which is glossy, flinty, and of

great weight. We planted a small patch of it last year; but unfortunately for our attempt to test its productiveness, it was planted on the 14th of May, came up in the midst of the drenching and long continued rain, which commenced the latter part of that month, and continued the most of June; and then had to endure the withering drought which succeeded it—added to these disadvantageous circumstances, which were fatal alike to its growth as to its culture; it was planted on a piece of ground, the vitality of which had been extracted by the previous occupant of the place. But amidst all these evils, it maintained a healthful dark green appearance, and matured its kernel in about 90 days. Of what its yield was, we cannot speak, as we had the bad luck to have our enclosures broken down by eight head of cattle on the night of the 7th of August, which remained in the field from an early hour in the night, until after day-light next morning, eating, knocking down, and otherwise destroying the ears and stalks. On the morning of the eighth, we gathered up several bushels of ears that had been knocked off the stalks, and to our surprise discovered that they were sufficiently hard for grinding. It is a variety of corn, which, from its low stature, will bear very close planting. In some of the counties of New York, it is customary to plant it but 27 inches apart, either way, and to let four stalks remain in each hill. Our's were planted three feet apart each way, four stalks in the hill, and we did not perceive, the condition of the soil and the nature of the season considered, that it was retarded in its growth by its nearness. In good ground, we are certain that it would yield at that distance to the fullest extent of its capacity. Many hills afforded two good ears for each stalk of the four which stood thereon, and we are confident, that, on good ground, properly manured and cultivated, it would average nearly that. It was our intention when we planted it, if it should prove productive, to endeavor to introduce its culture more generally, as from its early maturity, and capacity to endure close planting, we were, and still are, of opinion, that as our seasons are so precarious and the grub and cut worm so destructive, that it would

be found valuable, inasmuch as it might be planted as late as the 15th and 16th of June, with a certainty of its ripening in most seasons. We would not, of course, recommend so late planting, except in cases of necessity, where from casualties arising from the season, the worm, or birds, replanting should become necessary. We have said that it will mature if planted as late as the 16th of June, and we have so spoken, advisedly, having made the experiment last season and proved its truth. In the present state of scanty supply of breadstuffs, it strikes us that it would be an object with most planters and farmers, and especially with those in the southern states, to put in a part of their crops of this variety, because if planted on the 1st of April, as it might in many of the states south of Maryland, it would be fit for use in the beginning of July, and thus serve to eke out the stinted supply of grain of the last year. Again, would it not be judicious to plant this early variety in all fields intended for wheat, where it might be desirable to put in the plough before sowing? If sown thus early, and the stalks were cut and removed off the field, it would be in time to admit of ploughing, and seed-ing grain.

We have thrown out these suggestions, because, *first*, we are aware that much of the late planted corn, of the old varieties, are caught by the frost, and, *secondly*, because we think that, in addition, to the security of escaping such fate, it is a most excellent kind.

It was, we have said, our intention, when we planted it, if its yield should prove as great here as it had done East and North of us, to dispose of our crop for seed corn; but—as from the circumstances we have detailed, we were not able to respond to the character given it for fruitfulness in that quarter, and can only bear testimony in its favor for early maturity, hardiness and thrif, beauty and weight of grain, and competency to bear close planting,—we declined disposing of any but a very small quantity, determining, in our mind, to give it a *more perfect trial* next year. With this view we have prepared a piece of ground, the which, if the elements do not conspire against us, will be competent to elicit its virtues and test its value.

In closing we will remark, that the ears increased in size under our culture, from which we conclude, that, if enjoying the more genial influence of a southern climate, in good soil, it would improve with its acclimation, and thus add to its appreciation.

THE SUGAR BEET CULTURE AND MANUFACTURE.

A very interesting little work on this subject, has recently issued from the press of *Marsh, Capen, & Lyon, Boston*. It is a translation of parts of the interesting treatise of *M. J. Blachette* and *Zoega*, and is published with additions by *M. J. De Fontenelle*. We have read the work with much gratification, and, we trust, not without profit, and while we recommend it to the favorable notice of every agriculturist, we shall take the liberty of copying the chapter which we have given in another column. There are about twenty varieties of the beet, the kind however preferred by this author is the Silesian white radish beet, (*beta alba*.) He describes it as "rounded, pear shaped, white petioles, pulp white and of strong texture." This he says is "the variety recommended by Archard as the best and most productive," and yields the most sugar.

The beet he says "may be considered under four different relations of utility, viz :

- 1st. As an alimentary substance for man.
- 2d. As proper to supply fodder for cattle.
- 3d. Relatively to the sugar it contains.

4th. For the potash that may be obtained from it, by the incineration of its leaves and top."

In speaking of the product of sugar, he asserts, that experience has shown that the smallest beets, in a given weight, generally speaking, furnish a quantity of sugar greater than the larger, and that the juice of large roots does not mark scarcely from 5° to 6° on the hydrometer, while that of the smaller may go to 8° and sometimes to 10°. The small roots, also, it appears, present less difficulties in the manufacture: and that they are more economical, since the juice being more rich, has less water to evaporate.

The physical characters which may serve to make known a beet of good quality are these—it should be hard, brittle, make a noise under the operation of the knife, be perfectly sound, and if it savors more or less of sugar, that quality will show its richness.

Color, it appears, does not have any influence upon the quality and quantity of the product, but according to *M. Chaptal*, the sugar obtained from the red beet, retains a tint which makes it more difficult to whiten.

With this brief abstract, we shall content ourselves for the present, by directing the attention of the reader to the chapter selected for this day's paper.

Considerations on the Nature of the Soil, and the Climate which are suitable to the Beet.

The soil, its exposure, its nature, the climate to whose influence it is subjected, are the first considerations to which an agriculturist must give his attention for all culture in general, and which cannot be neglected when he acts on that of the beet in particular.

As a plant, having pivotant (single perpendicular) root, the beet requires a light soil, of good depth. Thus we must give preference to alluvial rich and sandy lands, or which may be inundated naturally every year, and thereby covered with a coat of slime, which will impart an artificial richness to it. Lands having natural or artificial meadows, after having, however, first taken from them a crop of grain, in order to give to the turf and the roots, which would impede the growth of the beets, time to be decomposed, are equally suited to this culture. Lands thus prepared may furnish two good crops of beets consecutively.

The product of high lands, in dry years, is inconsiderable; the roots not being able to attain all the growth of which they are susceptible, furnish, it is true, much sugar, in proportion to their size, but little, if we take into consideration, the surface of ground they occupy, and the quantity of sugar they would have given if they had attained only a middling size. The contrary happens in rainy years. It is altogether otherwise in low lands. The volume of beet is very great in rainy years, but the sugar that comes from it is very watery, and the quantity of sugar that may be extracted is very small. It is therefore necessary, in order to establish a constant relation, as nearly as possible between the volume of beet and the sugar, it will furnish, to cultivate this plant in grounds which are neither too dry nor too moist.

We may now draw this conclusion from what goes before, that it is not always the largest beets that present the most advantages in the extraction of the sugar.

The beets giving so much more sugar in proportion as the season has been more warm, it would be natural to think that it would be much more advantageous to cultivate them for this purpose in southern countries. But experience seems to have proved the contrary. In fact, though the beets cultivated in the south of France have a more sugary taste than those of the environs of Paris, they, however, furnish less crystallizable sugar, and even a few days after their maturity it is transformed into uncrystallizable. The reaction of these principles is with so much more rapidity in proportion as they are exposed to a high temperature. The 45th degree* seems to be the limit where we must

* There is a difference of about 6 degrees of temperature in the same latitude of Europe and America, which would allow us to cultivate it a little south of the above limit in this country.—But see note, next page.—Trans.

choose to cultivate them with a view to the production of sugar. We have supposed the existence of these different facts from the time when the experiments of *M. Archard*, were repeated in France. As much care as had been given to it, with all the variety of experiments used, we could not obtain from the same weight of beet a quantity of sugar equal to that which this chemist reports himself to have extracted from the white Silesian beet. The product which the factories of the Northern departments now obtain from the beet, with the improved process of extraction, and apparatus, have nearly approached, but have not, however, attained to the results announced by the Prussian chemist.

Notwithstanding all these facts, the conclusion which the learned author of the article *beet*, in the *Nouveau Dictionnaire d'histoire naturelle*, has drawn, of the impossibility that this kind of manufacture could prosper in the south of France, and to attribute to that cause the ruin of all those that were established there, does not appear to us strictly exact.† To the causes that we have mentioned in the preceding chapter as having exercised an unfavorable influence on this rising industry, perhaps must be added one that has been felt in the most disastrous manner in our southern departments: we allude to the deplorable system of fallow grounds.

The same variety, as we have said, does not always reproduce itself. It seems that in the act of vegetation it effectuates changes of the variety. These changes, it is ascertained, consist in alterations of the petioles and collets.

In a field sowed with the seed of the yellow beet only, there are always found some stems of the red and white. The seed of beet is sown in beds, or we sow it in sets to transplant.—We shall describe the manner in which these operations are done when we treat of sowing.

Some maladies frequently discover themselves in the beet during the course of its vegetation: they are generally of little importance, except the rickets which is known by the smallness and contortion of the leaves, by the discoloration of the roots, and by the complete absence of every savor in the pulp. The roots that are attacked with it must be pulled up. Insects do not appear to cause any sensible damage to it.

† Not only is this assertion not exact, but it is erroneous and anti-scientific. Experience has demonstrated to me that beets cultivated in the south of France and in Spain, follow the same laws of vegetation as other plants which are so much more rich in oily, aromatic and sugary elements, &c., as they grow in the warmer climates.

In this the beet does not depart in any manner from the general rule. I have in fact, tried a great number raised at Narbonne, Perpignan, Carcassonne, Castelnau, Toulouse, &c., and I have always found them more rich in crystallizable sugar than those raised at the north. I think, therefore, that we must attribute the want of success of the experimental schools of the south of France to the inexperience of those placed at their head, without having made any particular study of this kind of manufacture.

Mr. Harsteadt is, I think the first who has ad-

vanced, it is not known on what foundation, that the sugar beet appears to succeed better in northern climates, and that of consequence the manufacture of sugar appears to suit better these climates. This opinion appears to me to have something of the spirit of nationality. This is more probable, as M. Wagenmann has undertaken to combat this assertion by positive facts to which my experience brings a new support.

J. F.

SILK AND BEET SUGAR.

We copy the subjoined article from the "*Belvidere (N. J.) Apollo*," by which it will be seen, that Mr. Molleson, one of the representatives from Middlesex county, has introduced a resolution into the popular branch of the legislature of New Jersey, to appoint a committee to inquire into the expediency of encouraging the culture of Silk, and the manufacture of beet sugar in that state. This is a most wise and provident inquiry, and while we indulge the hope that it may be successfully carried through both branches of the legislature, we trust it will stimulate the members of every other legislative body in our country, where a similar measure has not been adopted, and the interests of whose citizens may require it, to follow the noble example thus set them by Mr. Molleson. The silk and beet culture, are both branches of husbandry, which, by proper management and care, if aided by our lawgivers, might be turned to the happiest account, and made to contribute alike to individual comfort and competency, and public wealth. When we reflect that nearly all our legislative bodies are composed in a great part of farmers, planters, and those whose interests are identified with them, we cannot but consent to believe that they will remain longer insensible to the advantages to accrue to the great body of our agriculturists; and, therefore hope that they will, by extending to those arms of industry, that protection and fostering care which they so richly deserve, entitle themselves to the thanks and gratitude of their constituents.

SILK AND BEET SUGAR.

We observe in the Legislative proceedings of Tuesday last that Mr. Molleson of Middlesex, offered a resolution to appoint a committee to inquire as to the expediency of encouraging the culture of Silk, and the manufacture of Beet Sugar, in this State. This attention to the agricultural interests of the State is highly commendable, and it is hoped action upon the subject may not be delayed. The importance of encouraging the culture of Silk, for the purpose of benefitting their citizens, and enriching the nation, has received the attention of the Legislatures of several states; and those of some of the New England States have authorized the

payment of premiums to the successful agriculturists. There is a natural and excusable timidity in the minds of the people upon commencing a new business, which will pass away before legislative encouragement and the successful experiments of the enterprising. All practical investigators pronounce the culture of Silk one of the most profitable branches of his business, in which a farmer can engage. And so far as our connexion with the New Jersey Silk Manufacturing Company in this county, gives us access to facts, by which to form an opinion, we fully concur with them. Ere many years are past, the amount of silks imported may be reduced by production, and most of the \$16,000,000 annually sent out of this country to purchase them, kept at home.

The reports of many intelligent persons at home, and the actual results of the business in France and parts of Germany, induce the belief that the time may come when our citizens will manufacture sugar for their consumption, and perhaps to export, from the Beets raised by our farmers. This business is of more recent origin than the culture of silk. We find it represented as being very profitable.

It is hoped the committee will do justice to the subjects submitted to their wisdom; and this is becoming more necessary now, since a disposition is evinced in Congress to withdraw national protection from the farmer and manufacturer."

A few days since on opening our mail, we found a stranger among our papers, which we discovered to be the *Milwaukee Advertiser*, published in the infant territory of Wisconsin. Upon opening it we discovered the articles which are placed below, marked for our insertion. We comply with this request with the more pleasure, as we observe in the first, the gratifying evidence that the hardy adventurers of that far distant land, are thus turning their attention with zeal and intelligence to the necessity of early husbanding the bounties of climate and soil, which it has pleased Providence to vouchsafe to them. Doubtless the larger portion of these pioneers are emigrants from the eastern states, where they have learned the advantages of agricultural associations, and have wisely taken the incipient step to secure to their new homes similar blessings to those they enjoyed in the land of their birth. They have, in all sincerity, our best wishes for the success of their generous effort.

At the exhibition of large Agricultural products raised in Milwaukee county, made on Monday last, in pursuance of a notice published in the *Milwaukee Advertiser*, premiums were awarded as follows:

To *Sylvester Pettibone*, of Prairie Village, for the heaviest bushel of oats, weighing 44 pounds 4 ounces.

For the largest ruta baga turnip, weighing 23 pounds 8 ounces.

To *John Douglas*, of Kiniekinie, for the largest English turnip, weighing 6 pounds 6 ounces.

For the largest radish, weighing 4 pounds 5 ounces.

To *John Day*, for the largest 10 potatoes, weighing 14 pounds.

BYRON KILBOURN.

It was concluded that the interest of the country required the formation of an Agricultural Society in this county, and notice is hereby given, that a meeting will be held on Saturday, the 28th day of January next, at the new Exchange buildings, for the purpose of organizing such a society. All persons who feel an interest in the subject, and in the prosperity of our new Territory, are requested to attend.

Our friend of the *Green Bay Democrat*, in his last number, advertises to the fine Agricultural productions of our country, and adds:

"There appears to be some strife between Dubuque and Milwaukee for superiority in producing. Look out for your laurels, neighbors, or Green Bay may step in and take them off. Can either Dubuque or Milwaukee furnish an account of a more extraordinary increase in the potatoe line, than that of which we published an account a week or two since? We throw down the glove at their feet, and place Capt. Scott against both."

We of Milwaukee will enter the lists with our friends of the north, and if Capt. Scott raised 60 potatoes which weigh over 68 and $\frac{3}{4}$ lbs., or 10 which average 14 lbs., then we acknowledge ourselves vanquished. We cannot give the amount of "increase" from a given amount of seed, as we are not aware of any such experiment having been made in our county.

We promised in a former number to give some extracts from the very able and interesting speech delivered before the *Central Agricultural Society and Mechanics' Institute of Lynchburg, Va.* by Achilles D. Johnson, Esq. and we redeem our pledge with the more pleasure now, because from the character of the parts which we give today, we feel confident that our readers will derive both pleasure and profit. In our next, we shall give other extracts embodying the practical views of this gentleman.

"Mr. President, it is doubtless expected and desired, by this time, that I should notice more particularly the operations of farming, and the physical requisites upon which it is based, to be profitable. And upon this subject, I must confess myself most especially defective. Perhaps, indeed, there may be some present, who might doubt,—most politely to be sure,—as to the propriety of my saying aught on this subject, seeing that my own operations do not come up to what I may suggest. To which I will only say, that I might retort upon them, perhaps—I might ask them if they have done all on their farms which they knew to be right? This society is a general fund, into which all are entitled and invited to throw their information, though it be only a mite—and I feel it my duty to give in mine on this occasion, as reflection may direct.

1st, I have said before, that a knowledge of

the formations of the earth, and of the ingredients of which its outer surface or soil is composed, is essentially necessary to the commencement of a good system of farming. It lies indeed at the very foundation of agriculture—and yet men have delved and delved upon their soil, like the Cyclops upon their anvil—as if the desired results were to be produced rather by many blows than by science—and as if they were condemned to the employment, without knowing or caring as to the materials on which they were operating. The two great ingredients of which the external crust of the earth is composed—Silicia or sand, and Alumina or clay—have been determined, by chemists, to constitute only the mediums for the extension and preservation of the roots of plants, and for the conveyance to them of those gases and liquids, which are contributed as their food. These, alone, contain nothing in them necessary to support vegetable life. Nature has therefore beneficially supplied other matter for the sustenance of plants. And in almost all countries, except the Deserts, which are deprived of all chemical combinations necessary for the support of life, lime, in some form or other, has been found to enter into the composition of soils. M. Puvir says, "that among these substances, the two first form almost exclusively three-fourths of soils—the third is found more or less mixed in the other fourth. All soils in which the latter earth is found, have similar characters, producing certain families of vegetables, which cannot succeed in those in which it is not contained. The calcareous element seems to be in the soil, a means and principle of fertility. Soils which contain calcareous earth in suitable proportions, suffer but little from moisture, and let pass easily in the lower beds, the superabundant water, and consequently drain themselves with facility." And on the other hand, it is said that it renders soils retentive of moisture, which otherwise, by their superabundance of sand, would have suffered almost an immediate filtration and evaporation of the water.

As to soils suitable for liming, M. Puvir furnishes some "visible characters," by which they are almost certainly to be distinguished. "The soils where the cow-wheat, rest harrow, thistles, colts foot, and red poppy spring spontaneously—which produce well in wheat, or plants of the pea kind, and especially sain-foin—where the chestnut succeeds badly—which shows but little of dog-tooth, volunteer grasses, or common weeds, except of the small leguminous kinds—soils which, after being dry, crumble with the first rain,—all these are almost certainly calcareous, and have no need of lime;" except, as Mr. Rufin maintains, in the form of gypsum, which he thinks might yet be beneficial. On the contrary, all soils composed of the moulderings of granite or scistus—almost all sandy soils,—those which are moist and cold, those where rushes, the heath, the whitish moss spring spontaneously, almost all the soils infested with dog-tooth, with bent-grass, red sorrel and little feverfew—that soil, where, unless so clayey as to offer great difficulty to cultivation, only rye, potatoes, and buckwheat can be made to grow, and where sain-foin, and where the greater part of the crops of commoners cannot succeed—where, however, trees of all descriptions, and especially of the re-

sinous kinds, the wood-pine, the sea-pine, the larch and the chestnut, thrive better than on the best land—all these soils are without the calcareous principle, and the improving manures in which it is found, would give to these the qualities of, and nourish the growth peculiar to calcareous soils."

The uses of liming in agriculture, from M. Puvir's reasoning, are as follows:

"1st. When a soil contains inert, animal or vegetable matter, their decomposition may be promoted, and it may be rendered fit for that which the soil gives out its sustenance. It is indeed the great mechanical employment to which nature has assigned the greater portion of the world's inhabitants. It should be applied, then, not with mere physical force, but with science—in a knowledge of the best mode and results in the production and improvement of the soil. A variety of opinion still exists, as to the proper depth to which the earth should be stirred and ameliorated. I unhesitatingly express it as my opinion, that for the sole purpose of a lasting improvement, deep ploughing is essentially necessary on all soils. For an immediate crop on a shallow soil, I admit that this mode not unfrequently operates deleteriously, by mingling about the roots of the plants too much of the substratum. But a further crop will grow better by finding a deeper penetration for its roots. If the sub-soil be clay, which I believe constitutes the under bed of nearly all our lands, it follows that deep ploughing contributes to a deep soil, which is not in danger of losing its fertility by a filtration of its vegetable nutrient into the beds below. Manures then, or vegetable matter, must have a tendency to ascend to the surface or to keep their place, and the roots of plants find a ready medium for their extension to a depth, which is calculated to support a firm and vigorous top. All plants which have a tap or perpendicular root, surely require a considerable depth of tillage. But I maintain that all those with only lateral roots, grow best and are most fruitful in a soil deeply penetrated by the plough. A soil thus prepared is more retentive of moisture in a dry season, and loses its superabundance of moisture in a wet one. But there is another argument in favor of deep ploughing, which I make particularly as my own suggestion. It may not unfrequently happen that the surface soil may not be composed of due proportions of sand and clay. Perhaps the substratum might contain the necessary deficient ingredient, and might be within the reach of a moderately deep plough. In this case, might not the operation of deep ploughing produce the desired result? If the surface is clayey, stiff and heavy, it might mingle sand with it, and if it be too greatly silicious and light, it might bring to the surface the necessary quantum of clay. But this argument I will leave to the development of the experimentalist. In favor of the deep cultivation of land, I will only say farther, that in England, and Scotland, and Flanders, where farms are necessarily small, by reason of a dense population, and where lands are consequently tilled with care to their greatest production, in many instances, first broken up with the spade forty, and fifty, and even sixty bushels of wheat to the acre is a frequent production. The superabundance of their root

to the advantage of deep ploughing I would suggest that of bedding in the soil. It occurs to me, that thin soils, either hill side or bottom, particularly such as are light and arid, would better sustain vegetation, and particularly young clover, by this operation. The plan I propose is to throw up the soil in the fall in beds of four to six furrows, having an especial regard to their horizontal direction, and leave it in that condition till the spring, when it should be seeded in oats and clover. The settling and gradual abrasion of the beds through the snows and atmospheric action of winter, will, I think, contribute to the sustenance and growth both of the grain and clover. This should be one of the great objects of all our farming—to give to all our old hills, and repudiated fields, an incipient life-spring of clover. In farther illustration of the reasoning I have advanced, I will mention the instance of Baron Von Voght, in Germany, given by himself. On the soil of his manor, which was greatly sterile, he commenced his operations by ploughing moderately deep. He applied his improving and alimentary manures, and at every succession of tillage, he ploughed them into a still greater and greater depth. He regularly altered his implements to suit his purposed depth of ploughing, and the result was, in a few years, a soil as deep and fertile as his most sanguine feelings could have desired.

[From the Genesee Farmer.]

SPRING WHEAT.

We invite the attention of the reader to the following valuable communication, from the Honorable JAMES M'CALL, of Allegany county, on the culture of Spring Wheat,—a subject which we think deserves more consideration among a large part of our farmers, than it has hitherto received. Judge M'Call is a practical farmer, and his long experience in agriculture entitles his opinions to the most respectful deference, while the success attending his operations proves the correctness of his system.

The silicious nature of the soil, the softness and purity of the water, and the entire absence of all calcareous matter in far the greater part of the southern tier of counties, clearly proves that while it is not adapted to the production of Winter Wheat, it is favorable to all kinds of spring grain, and the cultivation of the grasses. Skilful farming may, and the example of Judge M'Call proves sometimes does, overcome these obstacles to the cultivation of Winter Wheat, but the uniform experience of that whole range of counties shows that Spring Wheat is more certain and productive.

The excellence of this part of New York for grazing, and the raising of stock and the dairy, has been fully shown by the past; that the soil can be wanting in fertility will not be pretended by any one who has witnessed the extraordinary crops of oats produced under the most imperfect and early methods of culture; or the rich returns of Spring Wheat where a more scientific mode of farming is pursued. The capabilities of this region have as yet been but little appreciated, and its comparatively secluded nature has prevented the rapid settlement which would otherwise have taken place. A different prospect is now before

this section of the state, traversed by the New York and Erie rail road, and intersected by the Rochester and Olean canal, the difficulties that have attended a market, will be done away; and the thousands that are wending their way to the wild and desolate prairies of the far west, will many of them be diverted to a territory which must eventually become one of the finest farming regions of our widely extended country.

CULTIVATION OF SPRING WHEAT.

Extract of a Letter from the Hon. JAMES M'CALL of Rushford, Allegany Co.

In answer to your inquiry with regard to my experiments and experience in the culture of Spring Wheat, I have the pleasure of saying they have both been very satisfactory. Previous to 1833, I had not for fifteen years sown any of that kind of wheat; when I was induced to sow two acres with three bushels of seed. The product of these two acres was seventy bushels of wheat. In 1834 my winter wheat was very badly frozen out; I went on and harrowed in Spring Wheat as soon as the frost had left the ground. Twelve acres of this wheat produced two hundred and seventy-six bushels, or twenty-three bushels per acre. Another piece of five acres produced one hundred and forty-nine and a half bushels, or thirty bushels to the acre. Another piece sown on wheat stubble, produced twenty-two bushels to the acre.

Last spring I sowed ten acres of wheat stubble, which was ploughed once in November, and the seed was harrowed in as early in the spring as the frost would permit; this will yield me twenty bushels per acre. I also sowed four acres from which corn had been taken the year previous; and which will give me thirty bushels to the acre. As a continuation of my former experiments of sowing Spring Wheat on winter killed wheat, I sowed one bushel on spots where Winter Wheat had been killed out by snow drifts, one half of which at least was picked up by the pigeons, yet the remainder produced sixteen bushels, and had I have sown all that was killed out of the piece of nine acres, it would have added to my crop fifty bushels more.

I am so well satisfied with my experience on this subject, that I would in all cases where wheat is badly winter killed, whether in spots, or generally, recommend to sow the ground to Spring Wheat, and harrow it in as early as you are satisfied that the old roots are dead. Harrowing lightly over wheat that is alive will not injure the roots at all, and the scattering Winter Wheat that grows up will produce no injurious effect. Between the two you are sure of a good crop; and besides you keep out of the land, grass, weeds, and other foul stuff, such as cockle, chess, &c., which every farmer knows will spread on the unoccupied soil to a thousand fold.

Some of my best neighbouring farmers, have been for a number of years, in the practice of preparing their ground intended for wheat, in the previous fall, and sowing their Spring Wheat as stated above as early as possible, and have uniformly succeeded in getting good crops.

Spring Wheat is more apt to smut than Winter Wheat; but I have not had any smutty wheat of the kind, neither do I have any in my Winter Wheat. Being satisfied that smut is contagious,

I have for twenty years washed all my seed wheat in strong brine, (or pickle,) and skim off all that floats on the top. When the wheat has drained in a basket a few minutes, I mix dry lime with it, letting it lie twelve hours, and if longer it will sustain no injury.

There are two kinds of Spring Wheat raised by farmers in the county, the bearded and the bald; which is the best to yield I am not able to say, having raised none but the bearded; but it is evident the bald would be the most pleasant to work amongst.

Yours, &c.

JAMES M'CALL.

Rushford, Nov. 12, 1836.

[From the Pennsylvania Sentinel.]

SILK.

It must be admitted that the North is dependent, in great part, upon the South, for her present prosperity. Her own enterprise, industry and skill form of course, the primary source of her wealth; but without the productions of the South, without the South as a market for our productions, we would find our enterprise and industry unprofitable. Nine-tenths of the exports of this country, it is said, are raised by the slave holding states. To feed those states our grain growing regions are in requisition; our manufactures are sustained in clothing them; and our marine employed in carrying their staples to market. The North is without exports; and if, by a contingency not wholly improbable, she should be cast upon her own resources, it is difficult to define the disastrous consequences which would ensue.

Every friend of the North must be anxious to see her industry directed to pursuits which would make her independent—at least so far as independence can be expected or desired. For this purpose, the cultivation of the beet root has been patriotically encouraged, and promises to be completely and extensively successful. The culture of the silkworm has also attracted the attention of some of our most public-spirited citizens; and there is every reason to believe that, under the measures which have been and will be taken, it will be successfully introduced. We gave, in Tuesday's paper, the able report of a committee of our citizens on this subject. This report was, it is said, drawn up by N. Biddle, Esq. and presents the subject in a most interesting light to our public. The report commends in high terms, the domestic silk manufactory of Messrs. Upton & Jackson, in Stamper's alley, in this city; and recommend that they be purchased out and a company established. We do not doubt that the Legislature would incorporate such a company; and from all the information we have been able to gain on the subject, we are induced to believe that the operations of the Company would be immediately profitable. The report informs us that there are already many hundreds of acres in this state planted with the mulberry, small lots of cocoons are offered daily, and the committee entertain the belief that in 1837, one fourth of the supply for the manufactory of a moderate extent, can be obtained from American cocoons.

In three or four years, a manufactory with machinery and buildings, requiring a capital of \$100,000, may be supplied with American Silk.

Three hundred and ten good cocoons make one pound, and eight pounds of cocoons will give one pound of reeled silk. At that rate, the reeling being done at the manufactory, the cost of the silk will be about \$5 per pound. When cocoons are produced in abundance, the committee are disposed to believe that at 12 cents per pound, the raising of them will be as profitable as growing cotton at 15 cents per pound.

RAW SILK.—At the first going off our manufactories must depend chiefly on foreign raw silk.

The present prices of foreign raw silk are, Bengal, \$4 25 to \$6 per pound; China, \$5 50 to \$6; Italian, \$6 60 to 7 per pound.

The amount of manufactured silks imported into the United States in the year ending on the 30th of September, 1835, was \$7,497,909.

[From the Genius of the Farmer.]

GOLD MINES OF VIRGINIA.

The following paragraphs from a private letter, were highly interesting to us, and we presume will prove equally so to our readers.

"Professor Silliman has been recently in Virginia. He was employed by one or two companies who have gold mines in this quarter, to examine the ore, to make a detailed report of its value, and to communicate any other information, geological or practical, which might be of service to the companies. I understood he performed his duties to great satisfaction.

"These mines within a year or two past, have attracted the attention of speculators, almost as much as the public domain of the west, though not on the same extensive scale. They extend through several of the adjacent counties, and even into North Carolina,—the course being N. E. and S. W.

"Professor Rogers in his Geological Report to the Legislature, thinks the auriferous rocks are not of contemporaneous origin with the regularly stratified rocks of the vicinity, but that they were forcibly injected by igneous agencies from beneath, rising in directions of least resistance, and therefore generally, though not uniformly, following the stratification of the rocks through which they passed. This inference he deduces from the facts that the veins are not of uniform thickness between the walls of the adjacent rocks; but being on the contrary very irregular in their forms—at one point having a thickness of several feet; at another, very near to the former, contracting so much as only to measure a few inches across; and in other places sending off numerous veins into the enclosing strata. Another fact is that the dip is sometimes not conformable to that of the neighboring strata. The gangue is a variegated quartz.

"Professor Silliman in his report of an examination of the ore from one of the mines, gives it as his opinion that it is the richest in the world. From a bushel of the ore, he obtained (as well as I recollect,) about forty dollars worth of metal.—It is therefore probable that some years hence, when the aids of science shall be brought to bear on the subject, the quantity of gold may rival that which was found in possession of Montezuma and his subjects.

"Some months ago, I was in that part of the country, and was informed by an intelligent gen-

men engaged in mining operations, that there were abundant evidences of gold being dug there in former times. They had discovered several feet below the surface, in the course of their explorations, instruments which had been evidently used to detach the quartz from its beds; and these instruments exactly resembled in their shape, those now in use. They were in fact what we call picks, made of granite or some other very hard rock, and having a hole in the middle for a handle; the ends being each about nine inches long. It must have been a long time since they were in use. This is inferred from the circumstance that there are no external signs of the earth having ever been disturbed, the trees of the forest being as large as in any other place."

We have only room to remark that evidences of ancient explorations also occur in the Gold Mines of Georgia.

[From the Germantown Telegraph.]

ON THE DISEASES OF DOMESTIC ANIMALS.

NO. IV.

SYMPOMS OF GLANDERS.

Nasal discharge. The earliest symptom is almost invariably an increased discharge from the nostril; much in quantity—constantly flowing—not sticky at first—watery—a little mucus gradually mixing with it, and this continuing for an indefinite period of time before it assumes a viscid character.

The Left Nostril most frequently affected.

It is a singular circumstance that this discharge is much more frequent from the left nostril than from the right. M. Dupuy says, that out of eight cases of glanders, he met with one only with discharge from the right nostril alone. This difference in the affected nostril does not exist to so great an extent in the practice in England, but in two cases out of three, even here, the discharge is from the left nostril alone.

Progress of the nasal discharge. Inflammation cannot long continue without producing some disorganization of structure or alteration of function in the affected part; and the disease having existed for a greater or less length of time, the secretion from the nose is altered in quality as well as increased in quantity, and we have the peculiar viscidity of which all our writers speak, and which cannot be mistaken. The discharge is more transparent than that of catarrh—it has seldom any offensive smell, it still continues to flow constantly on, and it has a singular stickiness unpleasantly adhering to the finger, and sometimes in a manner glueing the nostrils together. This also continues for an indefinite period of time, until the disease has committed greater ravages on the membrane in which it is seated, and the discharge becomes bloody, purulent, and offensive. Ulceration has then taken place in the membrane of the cavity, or of some of the cells connected with it. The color of the septum will now begin to change. It has usually been described as pale, or livid, or brown, in glanders. In the early stage of the disease, however, it has a decided, and sometimes, intense redness of hue. It indicates inflammation, and the degree of inflammation which exists. But when that inflammation has weakened the mem-

branes on which it existed, and the process of ulceration commences, it becomes pale, livid, leaden-colored, or brown.

Chancrous ulceration of the nostril. The ulceration once established, the disease hastens in its progress, and the sores begin to be visible on the lower part of the septum; they are sores of a peculiar character, not mere abrasions—not stripes of excoriation as we sometimes see in a nail grot—not the undefined ragged ulcerations, which are usually consequent on inflammation, but distinct ulcers—chancres—with rounded, elevated, well-defined edges. They are found, not scattered here and there upon the septum, but in regular succession; they follow the course of the vein which runs down towards the centre of the septum, and contiguous to which, and lying almost in contact with it, are the absorbent vessels of the septum. Particular attention should be paid to this, with reference to another form, or perhaps stage of glanders, which we shall presently consider, namely, *Farcy*—inflammation and ulceration of the superficial absorbents, and showing already the connexion between these maladies, or rather their identity.

These ulcerations sometimes spread over the greater part of the cavity. They occasionally produce, or are accompanied by caries (mortification) of the ethmoid and turbinated bones: they eat fairly into them; but the ulcers on the septum are, in most cases superficial, and the perfect separation is still preserved between the diseased nostril and the sound one. When these chancres appear, the case is usually a lost one: but in a few instances, either by the power of medicine or of nature, these chancres take on a healthy character, cicatrize and disappear. Ulcers have rarely long appeared in the nostrils before the constitution becomes affected: the coat staves; it has a peculiar pen-feather appearance, scarcely ever seen in simple want of condition. There is a strange dryness and stiffness of the skin, the hair comes off on the slightest touch, the belly is tucked up to an extraordinary degree, and the strength rapidly declines; there is cough, difficult and painful; the inflammation or ulceration has then travelled down the windpipe, and the lungs are evidently affected; the breathing becomes difficult from another cause; the lining membrane of the nose is thickened by the inflammatory and ulcerative processes; the air passage is obstructed and almost closed, and each act of respiration is accompanied by a hoarse roaring sound: there is a peculiar tenderness about the forehead, it becomes thickened, and gives an appearance of swelling: the whole head, and face, and muzzle particularly swell. *Farcy* now is superadded to glanders, or glanders has degenerated into *farcy*: or rather, perhaps more of the absorbents are involved; and little tumors appear about the muzzle, face, and neck, following the course of the veins, (for these point out the direction of the absorbents,) and the tumors rapidly ulcerate. Tumors, still pursuing the course of the absorbents, now appear on the inside of the thighs, and they are connected together by a corded substance; this is the inflamed and enlarged lymphatic, and ulceration soon spreading, rapidly follows the appearance of these buds. The deeper seated absorbents are now

affected: one or both of the hind legs swell tremendously, and become stiff, hot, and tender. The loss of flesh and strength can now be marked every day: the membrane of the nose becomes of a dirty livid color; that of the mouth is strangely pallid; the membrane lining the eyelid is infiltrated with a yellow fluid, like a sheep with the rot: the discharge from the nose becomes more profuse and insufferably offensive: the animal presents one mass of putrefaction, and at length perishes exhausted.

BEES.

When the queen-bee is forcibly taken away from the hive, the bees which are near her at the time, do not soon appear sensible of her absence, and the labors of the hive are carried on as usual. It is seldom before the lapse of an hour, that the working-bees begin to manifest any symptoms of uneasiness; they are then observed to quit the larvæ which they had been feeding, and to run about in great agitation, to and fro near the cell which the queen had occupied before her abduction. They then move over a wider circle, and on meeting with such of their companions as are not aware of the disaster, communicate the intelligence by crossing their antennæ and striking lightly with them. The bees which receive the news, become in their turn agitated, and conveying this feeling wherever they go, the alarm is soon participated by all the inhabitants of the hive. All rush forward, eagerly seeking their lost queen; but after continuing their search for some hours, and finding it to be fruitless, they appear resigned to their misfortune, the noisy tumult subsides, and the bees quietly resume their labors.

A bee deprived of his antennæ, immediately becomes dull and listless: it desists from its usual labors, remains at the bottom of the hive, seems attracted only by the light, and takes the first opportunity of quitting the hive, never more to return. A queen-bee, thus mutilated, ran about without apparent object, as if in a state of delirium, and was incapable of directing her trunk with precision, to the food which was offered to her. Latreille relates that, having deprived some laboring ants of their antennæ, he replaced them near the nest; but they wandered in all directions, as if bewildered, and unconscious of what they were doing—Some of their companions were seen to notice their distress, and approaching them with apparent compassion, applied their tongues to the wounds of the sufferers, and anointed them with their saliva. This trait of sensibility was repeatedly witnessed by Latreille, while watching their movements with a magnifying glass.—*Dr. Boget's Bridge-water Treatise.*

The following incident, illustrative of the affection of bees for their queen, is very graphically described by Mr. Bagster, in his work on the *Management of Bees*, an occupation to which the author seems enthusiastically attached. Our readers are probably not aware that the process of taking the honey is not necessarily attended, as was formerly the case, with the destruction of the wonderful little insects, who with so much labor and skill have hoarded their treasures as a provision against future exigencies. A species of large mushroom, (*Fungus maximus*), commonly

known by the name of "bunt," "puck-fist," or "frog-cheese," is humanely employed by those who wish to spare the lives of their bees, whilst taking possession of their sweets. A small piece of this "puck," previously dried and properly prepared, being ignited and placed underneath a hive, operates by its vapour as a powerful narcotic upon the bees which fall unhurt into an empty hive, placed to receive them. By exposure to the fresh air, these bees are soon restored to health and activity; when they set about repairing the loss which, during the temporary suspension of their busy existence, they have sustained. Mr. Bagster had been taking some stocks of honey, in the way we have just mentioned, when an accident happening to one of his hives, the queen-bee was thrown out, and a scene of distress and considerable confusion ensued.

"I thought," says Mr. Bagster, "that I might put the queen into possession amongst some of the comb; but to be certain, I gathered up every bee I could find, and put the emptied hives on their side against mine, so that the queen might have every opportunity to get in, if not already there. The profusion of spirit honey, the hot weather, and the bees from my other hives, caused a great commotion, so that the real cause, the absence of the queen, was undiscovered. The next day, the same hurley-burley continued; when, fearing that my queen was unseated, I took an apian friend to form a judgment. It was his opinion that there surely was a queen in my new hive, or that if destroyed, one soon would be made out of the brood comb. I pointed to groups of bees on the grass, and around the stand, still fearing that my queen was among them; but he so positively said such was not the fact, that I did not then examine any of the masses. Naturally inquisitive under such circumstances, I visited my perturbed hive late in the evening, and found, while the others were quiet, that this was in an uncomfortable state. All the masses or companies of bees, which had been licking up the dropping sweets through the day, had now retired, save only a lot, about as large and as round as a small cricket-ball. At dark I again visited them—hope revived, for the mass remained unmoved: by the earliest peep of day I rose from bed, after a sleepless night to look for my beauty.

"I confess myself an enthusiast; I laid myself at full length on the grass, and with my hand opened the benumbed mass: there was the queen, surrounded by her faithful and watchful subjects, paralyzed, and to all appearance quite dead. I picked her up, placed her in my hands, breathed upon and cherished her for a considerable time, until, I think with joy of a new kind, I saw her move one joint of one leg; my tender care was renewed until the sun had mounted high in the heavens, and by his beams renewed the perturbation of the defenceless hive; and then, indeed courage was necessary, for the bees had just missed their queen. To those alone who have witnessed such commotion can an idea be conveyed.

"Now came the delightful scene,—my queen was restored by the genial warmth of my hand, and walked comfortably about it, the bees her

subjects, were whirling in incensed crowds around the hive; the buzz of discontent was incessant, and clearly marked. At this moment I called all who were in the house to witness the scene. I placed the queen on the alighting-board at the door of the hive: she was recognised in a moment; the pass-touch, or pass-word, or passum, was communicated. The great commotion was instantly changed to peace. She was caressed,—licked over and fondled,—the bees pressing round, who, with an affection worthy of the best subjects of a beloved monarch, showed their attachment in terms that even human tongues could not exceed.

"From that moment all was peace and harmony, and joyful labor. Very few of the brood were destroyed by the accident which gave rise to the development of this peculiar instinct; and I hope I treasure up the remembrance of the circumstance, as one more proof of the truth of that passage of Scripture, "God doth great things, and unsearchable; marvellous things out of number."

A NEW MOTIVE POWER.

Messrs. Davenport & Cook of Saratoga, after several years of study, have according to the Sentinel, of that village, succeeded in constructing an Electro-Magnetic Apparatus, which consists of a stationary magnetic circle, formed of disconnected segments. These segments are permanently charged magnets, the repelling poles of which are placed contiguous to each other.—Within the circle stands the motive wheel, having projecting galvanic magnets, which revolve as near the circle as they can be brought without actual contact. The galvanic magnets are charged by a battery, and when so charged, magnetic attraction and repulsion are both brought into requisition in giving motion to the wheel—the poles of the galvanic magnets being changed more than a thousand times per minute.

A model in which the motive wheel was 5½ inches in diameter, elevated a weight of twelve pounds. Another model was exhibited with a motive wheel of 11 inches diameter, which elevated a weight of eighty pounds.

Several individuals, agents of Messrs. Davenport and Cook, are about departing with models to secure letters patent, in the different countries of Europe and South America.—*Providence (R. I.) Journal.*

A WARRIOR'S OPINION OF WAR.

The following is singular language to be used by a brother of Napoleon. It is from an answer of Louis Bonaparte to Sir Walter Scott:

I have been enthusiastic and joyful as any one after a battle; but I also confess, that the sight of a battle field has not only struck me with horror, but turned me sick; and now that I am advanced in life, I cannot understand any more than I could at fifteen years of age, how beings, who call themselves reasonable, and have so much foresight, can employ this short existence not in loving and aiding, but in putting an end to each other's existence, as if Time did not himself do this with sufficient rapidity! What I thought at fifteen years of age I still think—"wars, with the pain of death, which society draws upon itself, are but

organized barbarisms, an inheritance of the savage state," disguised and ornamented by an ingenious institution and false eloquence.

FARMER'S REPOSITORY

No. 36 IV. Pratt-street, Baltimore, Jan. 25.

THE proprietor avails himself again of the commencement of a New Year, to express his grateful thanks to his numerous friends and customers for their kind and liberal support of his Agricultural Establishment, and is happy to say that his ceaseless exertions to accommodate the public, have not been without a corresponding encouragement from them, and with his present Improvements and Machinery, he is able to manufacture his Agricultural Implements much better than formerly, and with greater facility, and hopes to merit continued patronage. He now presents to the public an article new in its construction, for grinding corn and cob for feeding horses and stock. To those who approve this mode of feeding, this machine is worthy their attention. Also, Corn Shellers to be worked by hand or horse-power. He has a variety of Sraw Cutters; but his own patented Cylindrical Straw Cutter is not surpassed by any other implement of the kind in existence; he has recently made some improvements in their construction, which adds to their cost, and for which he has been obliged to add a trifling advance on the price of the small size:—his prices for them being as follows, viz:

11 inch Revolving bottoms	\$30, with extra pair of knives,	\$33
11 " Permanent Bottom	28, do do do	31
13 " " 43, do do do	48	
13 " Revolving Bottom 45, do do do	50	
15 " " 50, do do do	56	
20 " Large size fitted for horse-power 80, do do	90	

His variety of ploughs embraces almost every description and size that are worthy of notice, from a small seed Plough to the large rail road Plough—Gideon Davis' Improved Ploughs in all their variety, with cast and wrought shares; these castings are now made on his own premises, of the best stock and with special care; a supply of them always on hand to sell separate from the ploughs when required. Ox Scrapers for levelling hills, &c.; common and patent Wheat Fans; Fox & Gorland's spring concave Thrashing Machines, large and small size, and portable horse powers for the latter; also one of Z. Booth's 2 horse Thrashing Machines and stationary horse power for the same; Brown's vertical patent Wool Spinners, and Watson's patent Washing Machine, both very simple and useful machines for families; Harrows; double and single corn and tobacco Cultivators; superior grain Cradles; and a great variety of other farming implements of a prime quality; and all on reasonable terms, at wholesale and retail.

Likewise in store—Orchard Grass, Timothy, and Herbs Grass seed of superior quality.

JONATHAN S. EASTMAN.

A JACK FOR SALE.

THE editor of the Farmer and Gardener, Baltimore, has for sale a small though beautiful and well bred Jack. He was got by Capt. Gordon's celebrated Malta Jack: his dam was a descendant of General Washington's Spanish Jennet. He will be 5 years old next spring, is 46 inches high, straight limbed and finely proportioned. His sire was distinguished for his great vigor and power in serving mares, being known to have done good service to six, in as many hours, and it is believed, that though his son is small of stature, owing to bad keep, that he inherits equal verility with his sire.

Price, \$500.

All letters upon the subject must be post paid.

CONTENTS OF THIS NUMBER.

Notices—of the value of the early Canada Corn—of the importance of the sugar beet culture and manufacture—considerations on the nature of the soil and climate suitable to the beet culture—encouragement to the silk and beet culture in New Jersey—agricultural productions and society in the far west—extracts from A. D. Johnson's able speech on agricultural improvement—productiveness of spring wheat—importance of the silk culture—gold mines of Virginia—diseases of animals—economy and affection of bees—a new motive power—a warrior's opinion of war—advertisements—prices current, &c.

BALTIMORE PRODUCE MARKET.

* These prices are carefully corrected every MONDAY

	PER	FROM	TO
BEEF, white field,.....	bushel.	1 76	—
CATTLE, on the hoof,.....	100 lbs.	6 50	8 50
COAL, yellow,.....	bushel.	98	1 00
White,.....	"	95	28
COTTON, Virginia,.....	pound.	—	—
North Carolina,.....	"	184	20
Upland,.....	"	18	21
Louisiana 20x21-Alabama	"	12 00	13 00
FEATHERS,.....	pound.	—	—
FLAXSEED,.....	bushel.	1 62	1 75
FLOWER MEAL—Bast wh. wh't fam.	barrel.	—	—
Do. do. better's.	"	10 50	10 75
Do. do. Superfine, ex.	"	10 75	11
Superfl. st. in good de'd	"	10 50	—
" wagon price,	"	10 00	10 25
City Mills, super,.....	"	10 25	10 50
Do extra,.....	"	10 50	—
Susquehanna,.....	"	7 25	7 50
Rye,.....	"	21 00	—
Kiln-dried Meal, in hhd's.	hhd.	4 62	—
do, in bbls.	bbl.	8 00	8 50
GRASS SEEDS, red Clover,.....	bushel.	3 00	3 75
Timothy (herds of the north)	"	2 75	—
Orchard,.....	"	2 75	—
Tall meadow Oat,.....	"	1 25	—
Herds, or red top,.....	"	20 00	—
HAY, in bulk,.....	ton.	7 75	8 50
Hemp, country, dew rotted,.....	pound.	7 25	7 75
Do, water rotted,.....	"	16	—
Hoops, on the hoof,.....	100 lb.	14	—
Slaughtered,.....	"	12	—
HOPS—first sort,.....	pound.	3 50	4 00
second,.....	"	62	65
refuse,.....	"	1 12	—
LIME,.....	bushel.	35	37
MUSTARD SEED, Domestic, —; blk.	"	3 50	4 00
OATS,.....	"	5 00	—
PEAS, red eye,.....	bushel.	1 35	1 40
Black eye,.....	"	3 50	4 50
Lady,.....	"	4 50	0 00
PLASTER PARIS, in the stone,.....	ton.	7 00	7 90
Ground,.....	barrel.	5 00	10 00
PALMA CHRISTA BEAN,.....	bushel.	6 00	8 00
RAGS,.....	pound.	8 00	12 00
RYE,.....	bushel.	12 00	16 00
Susquehanna,.....	"	4 00	5 00
TOBACCO, crop, common,.....	100 lbs	5 00	8 00
Do, brown and red,.....	"	5 00	8 00
Do, fine red,.....	"	5 00	8 00
Do, wavy, suitable for sugars,.....	"	5 00	8 00
Do, yellow and red,.....	"	5 00	8 00
Do, good yellow,.....	"	5 00	8 00
Do, fine yellow,.....	"	5 00	8 00
Seconds, as in quality,.....	"	5 00	8 00
Do, ground leaf,.....	"	5 00	8 00
Virginia,.....	"	7 00	14 00
Rappahannock,.....	"	8 00	14 00
Kentucky,.....	"	2 10	2 30
WHEAT, white,.....	bushel.	2 10	2 15
Red, best,.....	"	1 25	1 75
inferior,.....	"	42	424
WHISKY, 1st pf. in bbls,.....	gallon.	39	—
Do, in hhd's,.....	"	36	37
" wagon price,.....	"	38	426
WAGON FREIGHTS, to Pittsburgh,.....	100 lbs	1 75	—
To Wheeling,.....	"	2 00	—
WOOL, Prime & Saxon Fleeces,.....	pound.	50 to 60	30 32
Full Merino,.....	"	45	50 28 30
Three fourths Marino,.....	"	42	45 26 22
One half do,.....	"	38	42 26 28
Common & one fourth Meri.	"	35	38 26 28
Pulled,.....	"	38	40 26 28
Howard st. Flour, sales limited, receipts very light.			

PLACE WANTED AS OVERSEER.

A young, industrious, and enterprising man, who is a good farmer and understands the management of hands, wants a situation in the stove capacity. Any person wishing to employ such a person will please address a letter to Miss Flannery, Chestertown, Md. no 15 St.

BALTIMORE PROVISION MARKET.

	PER	FROM	TO
APPLES,.....	barrel.	17	18
BACON, hams, new, Balt. cured.....	pound.	—	15
Shoulders, do,.....	"	—	15
Middlings, do,.....	"	—	15
Assorted, country,.....	"	—	14
BUTTER, printed, in lbs. & half lbs.	"	25	37
Roll,.....	"	20	28
CIDER,.....	barrel.	1 00	1 25
CALVES, three to six weeks old,.....	each.	4 50	6 00
Cows, new milch,.....	"	30 00	50 00
Dry,.....	"	10 00	13 00
CORN MEAL, for family use,.....	100 lbs.	2 06	2 12
CROP RTK,.....	"	—	2 25
Eggs,.....	dozen.	18	25
FISH, Shad, No. 1, Susquehanna,.....	barrel.	—	—
No. 2,.....	"	—	—
Herring, salted, No. 1,.....	"	3 50	—
Mackerel, No. 1, —— No. 2,.....	"	9 50	10 50
No. 3,.....	"	—	6 75
Cod, salted,.....	cwt.	—	—
LARD,.....	pound.	16	17

BANK NOTE TABLE.

Corrected for the Farmer & Gardener, by Samuel Winchester, Lottery & Exchange Broker, No. 94, corner of Baltimore and North streets.

U. S. Bank,.....	par	VIRGINIA.
Branch at Baltimore,.....	do	Farmers Bank of Virginia 1
Other Branches,.....	do	Bank of Virginia,..... do
Branch at Fredericksburg do	do	Petersburg,..... do
Banks in Baltimore,.....	par	Norfolk,..... do
Hagerstown,.....	do	Frederick,..... do
Westminster,.....	do	Winchester,..... do
Farmers' Bank of Mary'd, do	do	Lynchburg,..... do
Do, payable at Easton,.....	do	Danville,..... do
Salisbury,.....	5 per ct. dis.	Bank of the Valley,..... do
Cumberland,.....	1	Branch at Romney,..... 1
Millington,.....	do	Do. Charlestown,..... do
WHEELING,.....	do	Do. Leesburg,..... 1
Washington, {	2 1/2	Wheeling,..... 2 1/2
Georgetown, { Banks, J.	2 1/2	Ohio Banks, generally 3 3/4
Alexandria, {	2 1/2	New Jersey Banks 1 1/2
PENNSYLVANIA.	—	New York City,..... 1
Philadelphia,.....	1 1/2	New York State,..... 2 1/2
Chambersburg,.....	1	Massachusetts,..... 2 1/2
Gettysburg,.....	do	Connecticut,..... 2 1/2
Pittsburg,.....	2 1/2	New Hampshire,..... 2 1/2
York,.....	2 1/2	Maine,..... 2 1/2
Other Pennsylvania Banks, 1 1/2	2 1/2	Rhode Island,..... 2 1/2
Delaware [under \$5].....	3 1/4	North Carolina,..... 3 1/4
Do, [over 5].....	3 1/4	South Carolina,..... 3 1/4
Michigan Banks,.....	6	Georgia,..... 3 1/4
Canadian do,.....	6	New Orleans,..... 6

THE SILK MANUAL.

JUST published and for sale by Sinclair & Moore and Robt. Sinclair, Jr., at the Maryland Agricultural Repository, Light near Pratt street, Baltimore, a complete Manual of the Silk Culture, in which plain instructions are laid down for the culture of the Mulberry, the feeding of the Silk worms, management of the cocoons, reeling, spinning and dying of the Silk. In fine, it is a perfect Manual, and comprises every department of the business. The rules are arranged in so plain and methodical a manner that every one can understand them, and by a very few hours attention become master of the business. It is clearly demonstrated in this Manual, that largely upwards of \$500 may be netted from an acre in the Culture; and it is a singular fact connected with the Mulberry as adapted to the making of Silk, that poor dry, sandy, or gravelly land suits it best, the fabric made from worms fed on leaves raised on such soil, being greatly superior in elasticity and richness of gloss to those grown on rich grounds.

Price—per copy, 50 cents.

FOR SALE,

A half Durham and half Devon Bull, — years old of fine model and size. As his owner has no use for him he would be sold a bargain. Apply to the editor. no 15

CYLINDRICAL STRAW CUTTER.

The subscribers offer for sale Sinclair & Moore's Improved Cylindrical Straw Cutters, of various sizes, adapted to horse or manual power.

The very important improvements made by Moore, Sinclair & Moore on these machines, giving them extra strength and durability, have rendered them the most perfect and effective Straw Cutter in this country; they are so constructed as to be capable of cutting cornstalks and fodder, tangled hay, &c. with great ease, thus enabling the farmer to realize a profit by feeding to his cattle his corn fodder, which would otherwise be lost. These machines are self-feeders, the knives of spiral form, and act on a steel bed, in such a manner as to cut with great ease and despatch. The sizes are as follow, viz.

11 INCH BOX, suited to manual power, and capable of cutting 600 bushels of straw per day, being quite sufficient for the usual wants of farmers, price \$30 00

Extra knives for do. per sett,

14 INCH BOX, suited to manual or horse power: this size will cut 1000 bushels of straw per day, price 45 00

Extra knives for do. per sett,

20 INCH BOX, suited to horse or steam power, capable of cutting 125 bushels of straw per hour, price 75 00

Extra knives per sett,

8 00
The above named machines are all made with endless leather, movable bottoms; boxes with stationary bottoms are only made to order, being inferior, and a very trifling less in cost.

ALSO FOR SALE,

CORN SHELLERS, with vertical cast iron wheels, will shell 25 or 30 bushels per hour, price 20 00

Ditto Do. a powerful machine, adapted to horse power, and capable of shelling 80 to 100 bushels per hour, price 40 00

1800 PLOUGHES, of various patterns and sizes, including those in general use and most approved, price 4 50 to 20 00

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AND IN SHORT,

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Nov 22 1837